

ABSTRACT OF THE DISCLOSURE

A sensor for detecting the turning angle of a rotation shaft is separated a certain distance away from the shaft. The sensor comprises a light source for emitting light beams to a graduated color means mounted
5 on the shaft and a light reader for reading the corresponding reflected light beams back from the graduated color means. The graduated color means is a longitudinal sheet of film and attached onto the surface of the shaft in its circumference direction thereby rotating with the shaft synchronously. A serial of color points are formed on the graduated color
10 means along its longitudinal direction. The color points are arranged so as to the reflectivity thereof vary according to the requirements of the sensor.